Oregon Water Conditions Report August 13, 2018



Temperatures over the <u>past week</u> have been warmer than normal across most of Oregon. Temperatures over the <u>past two weeks</u> have been similar but not quite as warm in departure from normal. Temperatures for the <u>month of July</u> were warmer than normal across almost all of the state.

Oregon statewide water year precipitation at NRCS SNOTEL sites is holding at 86 percent of normal. The highest amounts of water year precipitation are currently in the Umatilla, Walla Walla, and Willow basins with 102 percent. The lowest values are in the Rogue/Umpqua basins at 77 percent with the Klamath and Harney basins not much better at 79 percent of normal for the water year.

Precipitation over the past two weeks has been below normal for most of the state. Precipitation for the <u>month of July</u> was also below normal, in some areas as low as 5 percent of normal.

Over the next <u>8 to 14 days</u>, the NOAA Climate Prediction Center is forecasting an increased probability of above-normal temperatures along with below normal precipitation across most of the state. The most recent <u>three month outlook</u> indicates increased chances of above-normal temperatures statewide. An increased probability of below-normal precipitation is forecast in the northwest corner of the state with equal chances of above or below normal precipitation the rest of Oregon. The next long-term outlook will be issued on August 16, 2018.

ENSO-Neutral conditions are expected to continue through the summer. There are increasing chances for El Niño conditions during the fall and winter. For more insight, refer to the August 9, 2018 <u>diagnostic discussion</u> issued by the Climate Prediction Center. For the latest discussion on the summer outlook, refer to the latest <u>ENSO blog</u> on the climate.gov website. The Climate Prediction Center will continue to monitor conditions and provide regular updates. The next ENSO Diagnostics Discussion is scheduled for September 13, 2018.

Statewide streamflows for July were less than 50 percent of normal. This is up from the 40 percent seen for the month of June. Regionally for July, streamflow conditions were about 45 percent east of the Cascades and 50 percent to the west. More recent conditions indicate that flows are ranging from under 25 percent in the John Day Basin to over 70 percent in the Hood Basin.

USACE Reservoirs: <u>Rogue:</u> Last week Lost Creek was at Level 1 evacuation from the Miles/Sugar Pine Fire. Flow release contingency plans are being discussed in case there is a need for project personnel evacuation.

Dry conditions and warm weather is forecasted to continue along with receding inflows. Lost Creek outflow continues to be maintained at over 1,600 cfs to support juvenile fish rearing needs. Currently the project is 63percent full and 37 percent below rule curve while inflows are holding steady around 1,030 cfs. Applegate outflow continues to be approximately 275 cfs and currently the project is 54 percent full and 45 percent below rule curve.

<u>Willow Creek</u>: Willow Creek inflow is ~ 6 cfs and outflow is 12 cfs. The project is currently 35 percent full and 65 percent below rule curve. The most recent irrigation demand is 12 cfs.

<u>Willamette</u>: The Willamette system continues to draft while augmenting mainstem flows. The project is currently 46 percent full and 54 percent below rule curve. System-wide inflow is 1,530 cfs and outflow is ~5,300 cfs. The USACE continues to provide water temperature management below Detroit and Fall Creek. The flow at Albany is ~5,000 cfs and at Salem is ~6,500 cfs.

USBR Reservoirs: In north central Oregon, <u>McKay Reservoir</u> is at 50 percent of capacity and about 90 percent of normal for this time of year. In the Willamette, due to high demand <u>Scoggins Reservoir</u> has been drawn down to 61 percent of capacity which is about 88 percent of normal. <u>Central Oregon</u> reservoirs are between 21 and 80 percent of capacity. Due to continued water use demand, Wickiup Reservoir is now at only 21 percent. <u>Eastern Oregon</u> reservoirs (not considering Thief Valley) are now at 18 to 51 percent of capacity. <u>Rogue Basin</u> reservoirs are between 18 and 46 percent of capacity. <u>Upper Klamath Lake</u> is currently at 43 percent of useable capacity.

The most recent update to the <u>US Drought Monitor</u> indicates continued expansion of drought conditions across the state. Indicators now point toward D2 (Severe Drought) for the two-thirds of the state. The August 7, 2018 report now shows that almost 90 percent of Oregon is listed as in "Moderate Drought" (D1) and 100 percent of the state is listed as "Abnormally Dry" (D0).

Seven Oregon counties are now under state declared drought status. More are likely to follow in the coming weeks. Refer to the Oregon Water Resources Department <u>web page</u> for the latest information.

Wildfire season is in full swing and monthly <u>outlooks</u> are now being posted. Visit the Oregon Department of Forestry's <u>wildfire blog</u> for the latest updates. More information can also be accessed through the Northwest Interagency Coordination Center <u>website.</u>

Another excellent resource is the Oregon Office of Emergency Management's <u>RAPTOR</u> incident mapping program which includes current situation data, such as wildfire perimeters, thermal satellite, fire evacuation boundaries, and air quality info.

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Precipitation (Mountain) - Percent of Normal



Compared to this time last year -



Page:

Temperature – (1 Month) Departure from Normal

Website: <u>https://wrcc.dri.edu/wwdt/index.php?region=or</u>

PRISM > Temperature Anomaly 1 Month > Oregon



Oregon - Mean Temperature

Website: http://www.wrcc.dri.edu/wwdt/index.php?folder=pon1

PRISM > Precipitation Anomaly 1 Month > Oregon



Oregon - Precipitation July 2018 Percent of 1981-2010 Normal

August through October

Website: <u>http://www.cpc.ncep.noaa.gov/products/predictions/long_range/seasonal.php?lead=1</u>



Website: <u>http://www.hydro.ucla.edu/SurfaceWaterGroup/forecast/monitor_pnw/index.shtml</u>



Total Moisture Percentile





Compared to this time last year:





Streamflow Conditions – Willamette





Streamflow Conditions – Mid Coast

